

PAVLOV, Ya.P., kand.tekhn.nauk, dots.; KIRDYASHOV, Yu.N., kand.tekhn.
nauk, dots.; LEBEDEV, A.S., kand.tekhn.nauk, dots.; FEDOSOVA,
I.V., assistant

Coefficients of friction for asbestos-bakelite materials. Trudy
LIMI no.23:5-17 '58. (MIRA 12:5)
(Bakelite--Testing) (Friction)

FEDOSOVA, L.N.

Diagnosis of achlorhydria by the esmold test of Sahli. Vrach. delo
no.11:12-15 N '61. (MIRA 14:11)

1. Kafedra terapii I (zav. - chlen korrespondent AMN SSSR, prof.
D.F.Chebotarev) Kiyevskogo instituta usovershenstvovaniya vrachey.
(GASTRIC JUICE ANALYSIS)

LOZHKO MOYNOVA, A.D.; TRESTMAN, A.G.; LEONT'YEVA, R.S., mladshiy nauchnyy
sotrudnik; PODOLYAN, A.P.; TRET'YAKOVA, O.I.; Prinimali uchastiyе:
PAVLOVA, I.A., inzh.; GORYACHEVA, G.A., starshiy tekhnik; SELI-
VERSTOVA, Z.P., starshiy tekhnik; FEDOSOVA, M.I., tekhnik;
GORSHKOVA, M.I., tekhnik; KOPEN'KA, V.K., tekhnik; TIMOF'EYeva,
V.F., tekhnik; KOSINOVA, Z.I., tekhnik. GONCHAROV, Ye.P., otd.
red.; USHAKOVA, T.V., red.; SERGEYEV, A.N., tekhn.red.

[Agroclimatic reference book on the Tajik S.S.R.] Agroklimati-
cheskii spravochnik po Tadzhikskoi SSR. Leningrad, Gidrometeor.
izd-vo, 1959. 151 p. (MIRA 13:2)

1. Stalinabad. Gidrometeorologicheskaya observatoriya. 2. Sta-
linabadskaya gidrometeorologicheskaya observatoriya Upravleniya
gidrometeorologicheskoy slushby Tadzhikskoy SSR (for Lozhkomoyeva,
Trestman, Podolyan, Tret'yakova). 3. Institut pochvovedeniya AN
Tadzhikskoy SSR (for Leont'yeva).
(Tajikistan--Crops and climate)

FEDOSOVA, N.I.

BELYAYEV, Vladimir Nikolayevich; MELENT'YEV, V.A., redaktor; FEDOSOVA, N.I.,
redaktor; GOLUBKOVA, L.A., tekhnicheskiy redaktor

[Balkhash Muskrat farm] Balkhashskoe ondatrovoe promyslovoe khoziaistvo.
Pod red. V.A.Melent'yeva. Moskva, Izd-vo tekhn. i ekon. lit-ry po
voprosam zagotovok, 1956. 19 p. (MIRA 9:10)
(Balkhash Province--Muskrats)

FEDOSOVA, N.I.

NAGAYEV, Nikolay Il'ich; SHIBANOV, S.V., redaktor; FEDOSOVA, N.I., redaktor;
GLUBKOVA, L.A., tekhnicheskiy redaktor

[Hunting ermine mink, and polecats] Promysel gornostaila, kolonka i
khoria. Pod red. S.V. Shibanova. Moskva, Izd-vo tekhn. i ekon. lit-ry
po voprosam zagotovok, 1956. 35 p. (MLRA 9:10)
(Trapping)

KORSAKOV, G.K.; SHIRINSKIY, A.A.; DENISOV, V.D., redaktor; PEDOSOVA, N.I.,
redaktor; GOLUBKOVA, L.A., tekhnicheskiy redaktor

[Using waters rich in vegetation for muskrat breeding] Zarastaiushchie
vodoemy i ikh ispol'zovanie dlja ondatrovodstva. Pod red. V.D.Denisova.
Moskva, Izd-vo tekhn. i ekon. lit-ry po voprosam zagotovok, 1956. 135 p.
(Muskrats)

PEDOSOVA, N.I.

LEYTES, Veniamin Grigor'yevich, kandidat tekhnicheskikh nauk; LYUKSEMBURG,
M.S., kandidat tekhnicheskikh nauk, spetsredaktor; PEDOSOVA, N.I.,
redaktor; GOLUBKOVA, L.A., tekhnicheskiy redaktor

[Raw hides, furs, and sheepskins; a commercial guide] Tovarovedenie
kozhhevennogo syr'ia, shubnoi i mukhovoi ovchiny. Moskva, izd-vo
tekhn. i ekon. lit-ry po voprosam mukomol'no-krupianoi, kombikormovoi
promyshl. i elevatorno-skladskogo khoziaistva Khleboizdat, 1956.
138 p.

(MIRA 10:1)

(Hides and skins)

KANTSEPOL'SKIY, Abram Samoylovich; KOZHEVNIKOVA, T.N., red.;
FEDOSOVA, N.I., red.; GOLUBKOVA, L.A., tekhn. red.

[Album of Persian lamb and krimmer skins] Al'bom ka-
rakulia i smushki. Moskva, Zagotizdat, 1962. 157 p.
(MIRA 16:11)

(Hides and skins)

FEDOSOVA, N.I.

DZHOROGYAN, G.A., nauchnyy sotrudnik; ZIBEL', B.Ya., inzh. [translator]; MESHCHERINA, O.Ye., bibliograf [translator]; KOZ'MINA, N.P., doktor biol.nauk, otvetstvennyy red.; ORIGOR'YEV, K.P., inzh., red.; KUPRITS, Ya.N., doktor tekhn.nauk, prof., red.; KUPIRIYANOV, A.V., inzh., red.; LYUBARSKIY, L.N., doktor sel'skokhozyaystvennykh nauk, prof.red.; LANDA-DALEV, L.M., starshiy nauchnyy sotrudnik; GERZHOY, A.P., kand.tekhn.nauk, starshiy nauchnyy sotrudnik; FEDOSOVA, N.I., red.; GOLUBKOVA, L.A., tekhn.red.

[Drying and heat processing of grain; translations and abstracts]
Sushka i termicheskaya obrabotka zerna; perevody i referaty.
Moskva, Izd-vo tekhn. i ekon.lit-ry po voprosam mukomol'no-krupianoi, kombikormovoi promyshl. i elevatorsko-skladskogo khoz., 1957. 90 p.
(MIRA 11:5)

1. Moscow. Vsesoyuznyy nauchno-issledovatel'skiy institut zerna i produktov ego pererabotki. 2. Vsesoyuznyy nauchno-issledovatel'skiy institut zerna i produktov ego pererabotki (for Dzhorogyan, Gershoy, Meshcherina). 3. Mel'kombinat imeni TSyurupy (for Zibel')
(Grain-Drying)

GORYANNIKOV, M.S., red.; GAFNER, L.A., red.; KHORTSEV, B.N., red.;
FEDOZOVA, N.I., red.; GOLUBKOVA, L.A., tekhnred.

[Flour, grain and feed industry of the U.S.S.R., 1917-1957;
a collection of articles] Mukomol'naia, krupiansia i kombi-
kormovaia promyshlennost' SSSR, 1917-1957 gg.; sbornik statei.
Moskva, Izd-vo tekhn.i ekon.lit-ry po voprosam mukomol'no-
krupianoi i kombikormovoi prom. i elevatorno-skladskogo khoz.,
1958. 189 p. (MIRA 12:2)

1. Nachal'nik Upravleniya mukomol'no-krupyanikh i kombikormovykh
predpriyatiy Ministerstva khleboproductov SSSR (for Goryannikov).
(Feed mills) (Grain milling)

KHUSID, Semen Davydovich, prof., doktor tekhn. nauk; FEDOSOVA, N.I., red.;
GOLUBEVA, L.A., tekhn. red.

[Grinding of grain; theoretical principles and practice] Izmel'chenie
zerna; teoreticheskie osnovy i praktika. Moskva, Izd-vo tekhn. i
ekon. lit-ry po voprosam mukomol'no-krupianoi, kombikormovoi
promyshl. i elevatorno-skladskogo khoziaistva, 1958. 247 p.

(MIRA 11:12)

(Grain milling)

GERASIMOV, Serafim Yakovlevich; PUSEN, Feodosiy Avdeyevich, kand.sel'skhoz.nauk; KABOZOV, S.M., kand.sel'skokhoz.nauk, spetsred.; FEDOSOVA, N.I., red.; KUZ'MINA, N.S., tekhn.red.; GOLUBKOVA, L.A., tekhn.red.

[Mixed feeds] Kombinirovannye korma. Spetsred. S.M.Kabozov. Moskva, Izd-vo tekhn.i ekon.lit-ry po voprosam mukomol'no-krupianoi, kombikormovoи promyshl. i elevatorno-akladskogo khoz. Pt.1. 1959. 140 p. Pt.2. 1959. 93 p. (MIRA 13:1)
(Feeds)

ALEKHIN, Boris Nikolayevich; REMENNYY, Leonid Iosifovich; SLAVOV, Georgiy Vasil'yevich; FEDOSOVA, N.I., red.; SAVEL'YEVA, Z.A., tekhn. red.

[Remote control of operations in grain elevators] Dispatcherskoe avtomatizirovannoe upravlenie operatsiami deistvuiushchikh elevatorov. Moakva, Izd-vo tekhn. i ekon. lit-ry po voprosam khlebo-produktov. 1960. 86 p. (MIRA 14:11)

(Grain elevators) (Remote control)

MISHUSTIN, Yevgeniy Nikolayevich, prof., doktor biolog. nauk; TRISVIAT-SKIY, Lev Alekseyevich, prof., doktor tekhn. nauk; VYSOTSKAYA, R.S., red.; FEDOSOVA, N.I., red.; SAVEL'YEVA, Z.A., tekhn.red.

[Microbiology of grain and flour] Mikrobiologija zerna i muki.
Moskva, Izd-vo tekhn.i ekon. lit-ry po voprosam khleboproduktov,
1960. 406 p. (MIRA 14:5)

1. Chlen-korrespondent AM SSSR (for Mishustin)
(Grain) (Flour) (Microbiology)

KOZIN, Aleksey Ivanovich, inzh.; FEDOSOVA, N.I., red.; GOLUBKOVA, K.A.,
tekhn. red.

[For communist labor; from socialist competition practice at the
S.M.Kirov Grain Milling Combine] Za kommunisticheskii trud; iz
opyta sotsialisticheskogo sorevnovaniia na mel'kombinat im. S.M.
Kirova, Moskva, Zagotizdat, 1961. 43 p. (MIRA 15:1)
(Leningrad—Flour mills) (Socialist competition)

FEDOSOVA, R.S., meditsinskaya patronazhnaya sestra (Moscow)

Work practice of a visiting nurse in preventing dysentery
in a polyclinic. Med.sestra no.10:19-20 0 '55 (MLRA 8:12)
(NURSES AND NURSING) (DYSENTERY--PREVENTION)

SOV/109-4-1-7/30

AUTHORS: Fedosova, T.S. and Samoylo, K.A.

TITLE: Frequency Divider with a Direct Lock-in (Delitel' chastyot s neposredstvennym zakhvatyvaniyem)

PERIODICAL: Radiotekhnika i Elektronika, 1959, Vol 4, Nr 1,
pp 43 ~ 53 (USSR)

ABSTRACT: The division of frequency is normally done by means of relaxation dividers, LC-type dividers or by means of combined circuits. The article deals with the theory of an LC-type divider and that of a combined divider. The diagram of a simple LC divider is shown in Figure 1; this consists of a resonant circuit and a feed-back circuit and comprises a source of the synchronising voltage. The amplitude and phase of the system are governed by the following simplified equations:

$$2 \frac{dU_m}{d\tau} = \rho J_0 \alpha - \frac{U_m}{Q} \quad (9)$$

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Frequency Divider with a Direct Lock-in

$$\frac{d\phi}{dt} = \sqrt{\frac{Q}{U_m}} J_0 \beta \quad (10)$$

where $\gamma = \omega_0 t$. In these equations $J_0 \alpha$ and $J_0 \beta$ are defined by Eqs (3) in which i_a denotes the amplitude of the anode-pulse current; Q denotes the quality factor of the resonant circuit, while $\sqrt{}$ is defined by Eq (6) in which ω_H is the nominal frequency of the system; ω_H is n times smaller than the frequency of the external electromotive force. The steady-state amplitude U_{mo} and the steady-state phase ϕ_{CT} are defined by Eqs (12) and (13). These equations can be used to analyse the LC divider shown in Figure 5. In this, the righthand-side tube converts a sinusoidal voltage into rectangular phase-inverted pulses which are fed to the grid of the lefthand-side tube. The external synchronising signal is in the form of a train of

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Frequency Divider with a Direct Lock-in

rectangular pulses; this is also fed to the grid of the lefthand-side tube. Consequently, the tube is conducting when both the voltages at the grid are equal to zero and it is closed when one of the voltages is negative. The envelope of the anode current pulses can be expressed by Eq (17), where i_m is expressed by Eq (18), where R_i is the internal resistance of the lefthand-side tube. The parameters $J_c\alpha$ and $J_c\beta$ can, therefore, be written in the form of Eqs (19) and (20). The steady-state amplitude U_{mo} and steady-state phase shift Φ_{CT} can be written as Eqs (28) and (29). The synchronisation bandwidth of the divider is defined by Eq (31) in which Φ_{make} is given by Eq (27). The following notation is adopted in Eq (27): τ_o is the length of the synchronising pulse expressed as a fraction of the oscillation period, T_o is the length of the pulse produced by the righthand-side tube (expressed as a fraction of the oscillation period) and T_{0-T} is defined by Eq (25). When the internal

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Frequency Divider with a Direct Lock-in

resistance of the tube is infinite, the amplitude and the phase are expressed by Eqs (33) and (34), respectively. If the synchronising pulses are in the form of a sinusoidal signal, the parameters $J_o\alpha$ and $J_o\beta$ are expressed by Eqs (38) and (39), respectively; in this case, it is found that the synchronisation bandwidth is about 30% lower than in the presence of rectangular synchronising pulses. Large synchronising bandwidths can be obtained if a combined divider consisting of a relaxation oscillator and an LC circuit is used. Block schematic of such a divider is shown in Figure 12, and its waveforms are sketched in Figure 13. The above analytical investigation was corroborated by the experimental data obtained by the authors from a number of special measurements. There are 14 figures and 5 Soviet references.

SUBMITTED: April 18, 1957

Card 4/4

SAMOYLO, K.A., kand. tekhn. nauk, dotsent; PEDOSOVA, T.S., inzh.; GORSHENKOV,
Yu.N., inzh.

Frequency division using a nonlinear capacitance. Trudy MEI 55:129-
144 '65.

Frequency division using a nonlinear capacitance and a negative
resistance. Ibid. 145-152
(MIRA 18:10)

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Friction pair of rollers with a slip speed of 2.35 m/min.

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showed that the highest rate of metal failure is observed in an
acid which has no

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BAZANOVA, I. S.; IONTOV, A. S.; MERKULOVA, O. S.; FEDOSOVA, T. V.

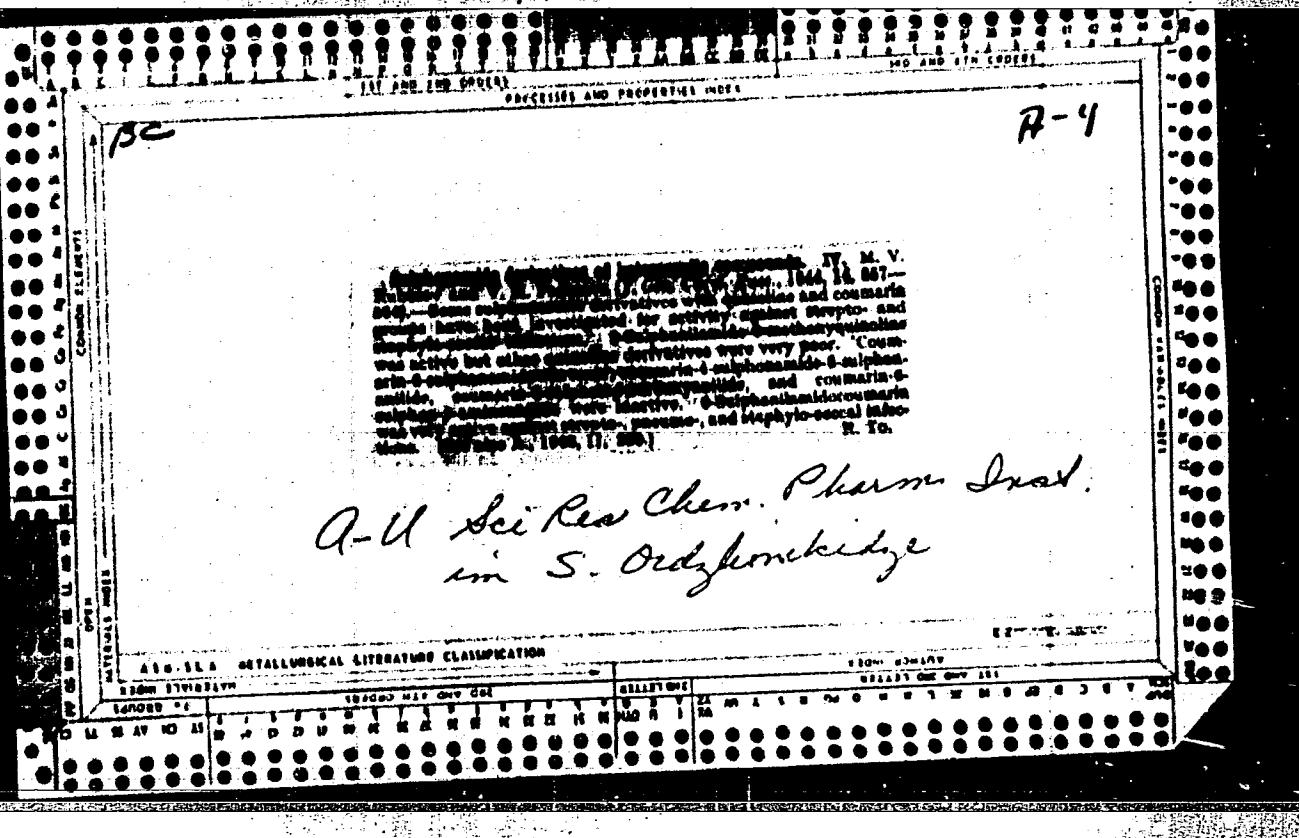
Relationship between the diameter of the synapses of neurons
of the anterior horns of the spinal cord in the cat and the
functional state of the central nervous system. Dokl. AN
SSSR 155 no. 2:474-477 Mr '64. (MIRA 17:5)

1. Institut fiziologii im. I. P. Pavlova AN SSSR. Predstavleno
akademikom V. N. Chernigovskim.

Derivatives of sulfanilamide. III. M. V. Rubtsov and V. M. Fedorenko. *J. Gen. Chem. (U.S.S.R.)* 14, 848-90 (1941) (English summary); cf. *C.A.* 35, 24837.—A no. of modified sulfanilamides were prep'd. and tested against streptocci and pseudomonads. All were inactive against the latter; the activity against the former is given as % of the activity of sulfanilamide (in parentheses after the synthetic data). 1-Diethylamino-4-aminopentane (10 g.) and 7.4 g. β -AcNHCl-NaOCl (1) gave 1-diethylamino-4-(β -acetoamido-phenylsulfamido)pentane, m. 122°, which was hydrolyzed by boiling with aqu. HCl-HCl to give 1-diethylamino-4-(β -aminophenylsulfamido)pentane-HCl, m. 218-19.5° (from EtOH) (21). Glycine (6.5 g.) treated with 10.6 g. I in 50 cc. water contg. 1.7 g. Na₂CO₃ gave the corresponding acetyl-sulfamide, m. 231-2° (from 50% HCl) (10). The corresponding ester, β -Cl, m. 181-2°, free ester, m. 180-90° (from water) (35). α -AcNHCl-NaCl (8 g.) in 35 cc. water with 15 g. I and NaOCl, m. 218.5 g. m-(acetyl)sulfamido-acetamide, m. 218.5-9° (from dil. AcOH), hydrolyzed with 17% HCl gave α -(β -sulfamido)acetamide, m. 173° (from 50% EtOH) (10). The corresponding ester was prep'd. analogously; the α isomer, m. 212-13° (from 20% AcOH). The free base, by hydrolysis with 20% NaOH, m. 203° (from 50% EtOH) (65). β -Sulfamido-phenol was prep'd. from I and β -aminophenol-HCl; β -Ac intermediate, m. 254-5°; free base, by hydrolysis with 20% NaOH, m. 108° (from 50% AcOH) (60). α -Isomer: α -Acetate, m. 210°; free base, by hydrolysis with 20% NaOH, m. 105° (35). α -Isomer: α -Acetate, m. 218° (from 50% AcOH); free base, m. 184° (20). I and anthranilic acid gave the α -(acetyl)sulfamido-benzoic acid, m. 231° (from 70% EtOH), which was hydrolyzed by aqu. HCl-HCl to α -sulfamido-benzoic acid, m. 220° (from 50% EtOH).

(from EtOH) (60). α -Isomer, m. 190° (from 20% AcOH) (30). β -Isomer, m. 197° (from 25% EtOH) (0). IV. *Ibid.* 857-61.—6-Methoxy-2-chloroquinoline (28 g.) in 50 g. PbOII was heated to 135° and treated with dry NH₃, cooled, treated with Mg-CO₂, filtered and treated with EtOH-HCl, and the septl. HCl salt neutralized to yield 6-methoxy-2-phenylquinoxaline, m. 181°, m. 46°. 6-Methoxy-2-chloroquinoline (17 g.) and 40 g. AcNH₂ were heated to 180° for 4 hrs. and 200° for 2 hrs. with treatment with gaseous NH₃; no reaction occurred; after addn. of 1.7 g. CuCl and continuation of the reaction for 12 hrs. at 200° there was obtained 0.7 g. 6-methoxy-2-aminoquinoline, m. 175° (from water). 4 g. of this and 5.4 g. β -AcNHCl-NaOCl (1) in pyridine gave after 3 hrs. at 90-100° 2-(β -acetamidophenoxy)sulfamido- β -methoxyquinoxaline, m. 246.6° (from 50% AcOH), which was hydrolyzed by 10% NaOH to 2-sulfamido-6-methoxyquinoxaline, m. 214.6° (from 50% AcOH). 4-Amino-6-methoxyquinoxaline (4 g.) and 5.4 g. I gave, as above, 24 g. 6-(β -acetamidophenoxy)sulfamido- β -methoxyquinoxaline, m. 292° (from water), which was hydrolyzed by 10% NaOH to 6-sulfamido-6-methoxyquinoxaline, m. 274° (from 50% AcOH). 6-Aminoquinoxaline (7.2 g.) and 11.7 g. I gave 6-(β -acetamidophenoxy)sulfamidoquinoxaline, m. 212°, which was hydrolyzed by 17% HCl to 6-sulfamidoquinoxaline, m. 200-10° (from 50% EtOH). Coumarin (10 g.), added with cooling to 40 g. CS₂H₂, heated to 100° for 4 hrs., cooled, and poured on ice yielded 10 g. 6-coumarinyl chloride, m. 110° (from CH₂C₂). Treatment with 15% NH₄Cl at 35° gave 6-sulfamido-coumarin, m. 185° (from water), while substitution of sulfanilamide for NH₄Cl gave 6-(β -sulfamophenoxy)-4-coumarin sulfamide, m. 219° (from 50% EtOH), and the use of β -AcNHCl-CO₂ gave 6-methoxy-4-coumarin sulfamide, m. 211° (from 50% AcOH). Coumarinsulfonyl chloride and β -AcNHCl-NH₂ gave β -sulfamido-6-coumarin sulfamide, m. 211° (from 50% AcOH).

mariadol/sonamide, m. 240° (from 75% Ac(II)), which was hydrolyzed by 10% NaOH to *p*-amino-*o*-coumarin/*o*-anilide, m. 210° (from 30% EtOH). *o*-Aminocoumarin (2.9 g.) with 2.4 g. I in *Me*₂CO gave 3.6 g. *d*-(*p*-acetamido-*Phenyl*)(*o*-amido)coumarin, m. 240° (from 75% Ac(II)), which was hydrolyzed with 10% NaOH to *d*-*o*-*anilidomethylcoumarin*, m. 191° (from 30% EtOH). Only the last compd. showed promising activity against streptococci, pneumococci, and staphylococci. G. M. Kondapoff



SAC-1000

FEDOSOVA, V. M.

PA 19/49128

USER/Chemistry - Coumarin, Derivatives Aug 48
 Chemistry - Sulfanilamide, Derivatives

"Sulfanilamide Derivatives of Coumarin," V. M.
 Fedosova, O. T. Magidson, All-Union Sci Res Chem
 Phar Inst imeni S. Ordzhonikidze, Moscow, 8 pp

"Zur Obshch Khimi" Vol IVIII (LXX), No 8

Prepared series of sulfanilamide derivatives of
 coumarin: 3-sulfanil-amide-coumarin, 3-sulfanil-6-
 sulfamide-coumarin, 6-sulfanilamido-3-carboxy-
 coumarin; corresponding amino-coumarins were prepared
 for this purpose. Established that during chloro-
 silylation of 3-acetamino-coumarin the trifluoromethyl

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USER/Chemistry - Coumarin, Derivatives
 (Contd) Aug 48

group takes up position 6. 6-nitro-3-carboxy-
 coumarin is best prepared by condensation of 5-
 nitro-salicylic aldehyde with malic acid in a
 frozen acetic acid medium. Sulfanilamide compounds
 prepared display very slight therapeutic activity
 against dysentery bacillus and are inactive against
 cocci and worms. Submitted 24 Mar 47.

19/49128

USSR/Chemistry

Card 1/1

Authors : Fedosova, V. M.; and Magidson, O. Yu.
Title : Alkamine esters of β -(4-oxyphenyl)- γ - phenyl-propionic acid.
Periodical : Zhur. Ob. Khim. 24, Ed. 4, 692 - 697, April 1954
Abstract : The authors synthesized dimethylaminoethyl, diethylaminoethyl, dimethylaminopropyl, diethylaminopropyl esters of β -(4-oxyphenyl)-alpha-phenyl-propionic acid as well as diethylaminoethyl ether of beta-(4-acetoxyphenyl)alpha-phenyl-propionic acid and other compounds. The mentioned esters and ethers may possess valuable biological properties. Ten references; 2 USSR since 1953; 4 Germans since 1877; 4 English since 1940.
Institution : S. Ordzhonikidze All-Union Scientific-Research Chemical-Pharmaceutical Institute.
Submitted : July 11, 1953

FEDERAL BUREAU OF INVESTIGATION
U.S. DEPARTMENT OF JUSTICE

USSR /Alkaline esters of 4-hydroxyphenyl-²-phenylpropionic acid. V. M. Fedosova and O. V. Medvedeva. Chem. Ind. (U.S.S.R.), 1954, No. 11, p. 701-6. H. L.

See C.A. 49, 62711.

FEDOSOVA, V. M.

USSR/Organic Chemistry. Natural Compounds and their
Synthetic Homologues.

E-3

Abs Jour: Ref Zhur-Khimiya, No 6, 1957, 19348.

Author : Magidson O. Yu, Fedosova V. M.
Inst :

Title : Synthesis of Tropacine (Hydrochloride of tropine ester
of Diphenylacetic acid)

Orig Pub: Khimiya and Meditzina, Vyp. 5, M., Medgiz, 1956, 14-20.

Abstract: Described is the preparation of tropacino--hydrochloride of the tropine ester of diphenylacetic acid (base I). By the action of Br on $C_6H_5CH_2CN$ (1.1 : 1 mole) at 105-110° is obtained $C_6H_5CHBrCN$, to a solution of which in 4.7 liters C_6H_6 at 20-40° is added 1335 g. $AlCl_3$; after boiling 1 hour the reaction mass is poured into a mixture of ice and HCl (acid) (10:1), yielding diphenylacetonitrile (II) 68%, b.p. 146-150°/5-6 mm, m.p. 69..

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USSR/Organic Chemistry. Natural Compounds and their
Synthetic Homologues.

E-3

Abs Jour: Ref Zhur-Khimiya, No 6, 1957, 19348

70°. The diphenylacetic acid (III) is obtained by hydrolysis of II. With a 30% solution NaOH (40 hours of boiling) and subsequent acidification with HCl (acid), the yield is 88% m.p. at 146-148°. From 0.4 kg III and 0.36 kg. $SOCl_2$ (5 hours at 60-70°) is obtained a chloranhydride of diphenylacetic acid (IV), yield 92.94%, m.p. 53-56° (after washing with benzene). From 225 g. tropine and 333 g. IV in 1.5 g toluene (4 hours at 110°) is synthesized hydrochloride I, which is purified by the isolation of I by an alkali, extraction with ether and transformation into the hydrochloride with 30% alcoholic solution of HCl, yield 83.5%, m.p. 210-212. I, b.p., 200-203°/1/2 mm, m.p. 55-56°. By product with m.p. 145° (from alc.) is of the following structure: $C_{21}H_{21}ON$.

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F. DosoVA, V. M.

MAGIDSON, O.Yu.; DOSOVA, V.M.

Synthesis of phenadone. Med. prom. 11 no.3:2.-28 Mr '57
(MLRA 10:4)

1. Vsesoyusnyy nauchno-issledovatel'skiy khimiko-farmatsevticheskiy
institut imeni S. Ordzhonikidze.
(METHADONE)

GOLOVCHINSKAYA, Ye.S.; FEDOZOVA, V.M.; CHEREKASOVA, .A.

Preparation of 8-(trichloromethyl)- theobromine and theobromine.
Zhur. prikl. khim. 31 no.8:1241-1245 Ag '51. (MIRA 11:10)

1. Vsesoyusnyy nauchno-issledovatel'skiy khimiko-farmatsevticheskiy
institut imeni S. Ordzhonikidze.
(Theobromine)

SHUKSTAL', Ya.V., kand. ekonom. nauk; VERKHOVSKIY, I.A., kand. ekonom. nauk; FOMIN, V.M., kand. ekonom. nauk; MEZENEV, N.I., inzh.; DMITRIEV, V.I., kand. ekonom. nauk; PADRA, V.A., inzh.; Prinimali uchastiye: ZOTIKOVA, V.I., kand. ekonom. nauk; YELISEYEVA, T.V., inzh.; KUBLITSKAYA, V.N., inzh.; KUDRYAVTSEVA, T.N., inzh.; MEZENEV, N.I., inzh.; TIKHONCHUK, M.K., inzh.; FEDOSOVA, V.N., tekhnik; DOBRETS, M.L., red. izd-va; TIKHOMIROVA, S.G., tekhn. red.; LUT, V.G., tekhn. red.

[Scope of the use of railroads and motor vehicles for short-distance freight haulage] Sfery primeneni a zheleznyodorozhnogo i avtomobil'nogo transporta pri perevozke gruzov na korotkie rasstoinia. Moskva, Izd-vo Akad. nauk SSSR, 1961. 197 p.

(MIRA 15:2)

1. Akademiya nauk SSSR. Institut kompleksnykh transportnykh problem.

(Transportation,Automotive) (Railroads—Freight)

RUZINOVA, I.L.; FEDOSOVA, V.Ya.

Colorimetric method for determining tin in tin ores. Izv. SO
AN SSSR no.11 Ser.khim.nauk no.3:56-60 '63. (MIRA 17:3)

1. Institut gornogo dela Sibirskogo otdeleniya AN SSSR, Novosibirsk,

BARYSHNIKOV, F.A.; Ruzinova, I.L.; Medosova, V.Ya.

Method for determining germanium in black coal. Izv. Sib. otd. AN
SSSR no. 5:75-80 '59. (MIRA 12:10)
(Germanium--Analysis) (Coal)

KAPUSTIN, B.N., glav. inzh.; GVOZDEV, T.T., glav. inzh.; GRIGOROVICH, V.D., inzh.; KONDRAHENKO, A.A., inzh.; ABADEEV, Yu.A., inzh.; RYADNOV, A.A., inzh.; YEGORYCHEV, V.P., inzh.; SHMEL'KIN, B.A., inzh.; MARSHUTIN, S.F., inzh.; KHODZHABARONOV, K.G., inzh.; FEDOSOVA, Ye.M., tekhnik; OSIN, V.I., tekhnik; SEMENOVA, Ye.P., tekhnik; AVSARAGOVA, G.A., tekhnik; PASHKEYEV, D.A., inzh.; KAFUSTIN, V.N., inzh.; NAGOROV, L.A., inzh.; IONOV, I.T., inzh.; KOPEYKINA, L.M., inzh.; TELEPNEVA, T.P., tekhnik; CHAKURIN, Zh.G., tekhnik

[Album of the mechanization of labor-consuming processes in stockbreeding] Al'bom mekhanizatsii trudoemkikh protsessov v zhivotnovodstve. Moskva, Izd-vo Ciprosel'khoza. No.4. [Equipment and supplies for the mechanization of labor-consuming processes on livestock farms] Oborudovanie i inventar' dlia mekhanizatsii trudoemkikh protsessov na zhivotnovodcheskikh fermakh. 1959 [cover: 1961. 229] p. (MIRA 15:7)

1. Gosudarstvennyy institut po proyektirovaniyu sel'skokhozyaystvennykh sooruzheniy (for Kapustin, Grigorovich, Kondrahenko, Abadeev, Ryadnov, Yegorychev, Shmel'kin, Marshutin, Khodzhabarono, Fedosova, Osin, Semenova, Avsaragova).

(Continued on next card)

KAPUSTIN, B.N.---(continued). Card 2.

2. Respublikanskiy gosudarstvennyy institut po proyektirovaniyu sovkhognogo stroitel'stva (for Gvozdev, Pashkeyev, Kapustin, V.N., Nagorov, Ionov, Kopeykina, Telepneva, Chakurin).

(Agricultural machinery)

FEDOSOVA, Ye.; REKKO, A.

Practical study of the progressive methods of work. Prof.-tekhn.
obr. 22 no.10:37 O '65. (MIRA 18:10)

1. Zam'stitel' direktora po uchebno-proizvodstvennoy rabote
novo-grigor'yevskogo sel'skogo professional'no-tehnicheskogo
uchilishcha No.6, Stavropol'skiy kray (for Fedosova).
2. Starshiy master Novo-grigor'yevskogo sel'skogo professional'-
no-tehnicheskogo uchilishcha No.6, Stavropol'skiy kray (for
Rekko).

FEDOSOVA, Ye.Ye.

Effect of novocaine and bromine on nitrogen metabolism in
old white rats. Trudy MOIP.Otd.biol.6:182-190'62 (MIRA 16:7)

1. Donetsk Medical Institute, Department of Biology.
(NITROGEN METABOLISM) (NOVOCAIN--PHYSIOLOGICAL EFFECT)
(BROMIEN--PHYSIOLOGICAL EFFECT) (OLD AGE)

1. FEDOSTSOV, A.
2. USSR (600)
4. Latvia - Telephone
7. Record of quality indexes of inter-district communications. Sov. sviaz. 3,
No. 1, 1953.

9. Monthly List of Russian Accessions, Library of Congress, May 1953. Unclassified.

"APPROVED FOR RELEASE: Thursday, July 27, 2000 CIA-RDP86-00513R00041272

FEDOS'YEV or FEODOT'YEV

Please see also FEODOS'YEV, FEODOT'YEV

APPROVED FOR RELEASE: Thursday, July 27, 2000 CIA-RDP86-00513R00041272C

AMR

CONFIDENTIAL

191. D. Y. Pautov and V. I. Gulyaev, "Stability of shells under large deflections" (in Russian), *Appl. Math. Mech. (Prikl. Mat. Mekh.)*, July-Aug. 1985, vol. 12, pp. 390-400.

The author follows the standard procedure to derive a system of 14 unknowns characterizing the equilibrium of thin shallow asymmetric shells under large deflections. Previous formulations of similar problems were concerned with flat plates and with special cases of shells of revolution subjecting to loading which preserves spherical symmetry. The resulting equations are too lengthy to be quoted here. They appear in the paper as five equations numbered (2.1), three equations (2.2), (2.3), and six equations (A.3). These equations lead to the equation for deflection w in the anticipated form

$$-p \frac{\partial^2 w}{\partial x^2} + T_r \frac{\partial^2 w}{\partial x^2} + 2p \frac{\partial^2 w}{\partial x \partial y} + 0.$$

where $w = w(x, y)$ is the equation of the middle surface before deformation, T_r and T_θ are the compressive forces and Q the shearing force, p the lateral load, and D the structural rigidity.

As an illustration of the solution of this problem the author considers a uniformly loaded circular plate no freely clamped along the contour so as to permit free displacements in the radial and tangential directions (that is, $T_r = Q = 0$ on the contour) and to preclude angular displacements. This mode of clamping admits the formation of folds which render the circular symmetry. This problem, discussed on pp. 390-400, is solved by Gulyaev's method. As one would expect, the computations leading to the determination of the amplitude of folds and for the instability criteria are very lengthy. I. N. Hohulinich, USA

Buckling
Problem

6

48-114-A METALLURGICAL LITERATURE CLASSIFICATION

ITEM NO.	100001-119	100001-120	100001-121	100001-122	100001-123	100001-124	100001-125	100001-126	100001-127	100001-128	100001-129	100001-130	100001-131	100001-132	100001-133	100001-134	100001-135	100001-136	100001-137	100001-138	100001-139	100001-140	100001-141	100001-142	100001-143	100001-144	100001-145	100001-146	100001-147	100001-148	100001-149	100001-150	100001-151	100001-152	100001-153	100001-154	100001-155	100001-156	100001-157	100001-158	100001-159	100001-160	100001-161	100001-162	100001-163	100001-164	100001-165	100001-166	100001-167	100001-168	100001-169	100001-170	100001-171	100001-172	100001-173	100001-174	100001-175	100001-176	100001-177	100001-178	100001-179	100001-180	100001-181	100001-182	100001-183	100001-184	100001-185	100001-186	100001-187	100001-188	100001-189	100001-190	100001-191	100001-192	100001-193	100001-194	100001-195	100001-196	100001-197	100001-198	100001-199	100001-200	100001-201	100001-202	100001-203	100001-204	100001-205	100001-206	100001-207	100001-208	100001-209	100001-210	100001-211	100001-212	100001-213	100001-214	100001-215	100001-216	100001-217	100001-218	100001-219	100001-220	100001-221	100001-222	100001-223	100001-224	100001-225	100001-226	100001-227	100001-228	100001-229	100001-230	100001-231	100001-232	100001-233	100001-234	100001-235	100001-236	100001-237	100001-238	100001-239	100001-240	100001-241	100001-242	100001-243	100001-244	100001-245	100001-246	100001-247	100001-248	100001-249	100001-250	100001-251	100001-252	100001-253	100001-254	100001-255	100001-256	100001-257	100001-258	100001-259	100001-260	100001-261	100001-262	100001-263	100001-264	100001-265	100001-266	100001-267	100001-268	100001-269	100001-270	100001-271	100001-272	100001-273	100001-274	100001-275	100001-276	100001-277	100001-278	100001-279	100001-280	100001-281	100001-282	100001-283	100001-284	100001-285	100001-286	100001-287	100001-288	100001-289	100001-290	100001-291	100001-292	100001-293	100001-294	100001-295	100001-296	100001-297	100001-298	100001-299	100001-300	100001-301	100001-302	100001-303	100001-304	100001-305	100001-306	100001-307	100001-308	100001-309	100001-310	100001-311	100001-312	100001-313	100001-314	100001-315	100001-316	100001-317	100001-318	100001-319	100001-320	100001-321	100001-322	100001-323	100001-324	100001-325	100001-326	100001-327	100001-328	100001-329	100001-330	100001-331	100001-332	100001-333	100001-334	100001-335	100001-336	100001-337	100001-338	100001-339	100001-340	100001-341	100001-342	100001-343	100001-344	100001-345	100001-346	100001-347	100001-348	100001-349	100001-350	100001-351	100001-352	100001-353	100001-354	100001-355	100001-356	100001-357	100001-358	100001-359	100001-360	100001-361	100001-362	100001-363	100001-364	100001-365	100001-366	100001-367	100001-368	100001-369	100001-370	100001-371	100001-372	100001-373	100001-374	100001-375	100001-376	100001-377	100001-378	100001-379	100001-380	100001-381	100001-382	100001-383	100001-384	100001-385	100001-386	100001-387	100001-388	100001-389	100001-390	100001-391	100001-392	100001-393	100001-394	100001-395	100001-396	100001-397	100001-398	100001-399	100001-400	100001-401	100001-402	100001-403	100001-404	100001-405	100001-406	100001-407	100001-408	100001-409	100001-410	100001-411	100001-412	100001-413	100001-414	100001-415	100001-416	100001-417	100001-418	100001-419	100001-420	100001-421	100001-422	100001-423	100001-424	100001-425	100001-426	100001-427	100001-428	100001-429	100001-430	100001-431	100001-432	100001-433	100001-434	100001-435	100001-436	100001-437	100001-438	100001-439	100001-440	100001-441	100001-442	100001-443	100001-444	100001-445	100001-446	100001-447	100001-448	100001-449	100001-450	100001-451	100001-452	100001-453	100001-454	100001-455	100001-456	100001-457	100001-458	100001-459	100001-460	100001-461	100001-462	100001-463	100001-464	100001-465	100001-466	100001-467	100001-468	100001-469	100001-470	100001-471	100001-472	100001-473	100001-474	100001-475	100001-476	100001-477	100001-478	100001-479	100001-480	100001-481	100001-482	100001-483	100001-484	100001-485	100001-486	100001-487	100001-488	100001-489	100001-490	100001-491	100001-492	100001-493	100001-494	100001-495	100001-496	100001-497	100001-498	100001-499	100001-500	100001-501	100001-502	100001-503	100001-504	100001-505	100001-506	100001-507	100001-508	100001-509	100001-510	100001-511	100001-512	100001-513	100001-514	100001-515	100001-516	100001-517	100001-518	100001-519	100001-520	100001-521	100001-522	100001-523	100001-524	100001-525	100001-526	100001-527	100001-528	100001-529	100001-530	100001-531	100001-532	100001-533	100001-534	100001-535	100001-536	100001-537	100001-538	100001-539	100001-540	100001-541	100001-542	100001-543	100001-544	100001-545	100001-546	100001-547	100001-548	100001-549	100001-550	100001-551	100001-552	100001-553	100001-554	100001-555	100001-556	100001-557	100001-558	100001-559	100001-560	100001-561	100001-562	100001-563	100001-564	100001-565	100001-566	100001-567	100001-568	100001-569	100001-570	100001-571	100001-572	100001-573	100001-574	100001-575	100001-576	100001-577	100001-578	100001-579	100001-580	100001-581	100001-582	100001-583	100001-584	100001-585	100001-586	100001-587	100001-588	100001-589	100001-590	100001-591	100001-592	100001-593	100001-594	100001-595	100001-596	100001-597	100001-598	100001-599	100001-600	100001-601	100001-602	100001-603	100001-604	100001-605	100001-606	100001-607	100001-608	100001-609	100001-610	100001-611	100001-612	100001-613	100001-614	100001-615	100001-616	100001-617	100001-618	100001-619	100001-620	100001-621	100001-622	100001-623	100001-624	100001-625	100001-626	100001-627	100001-628	100001-629	100001-630	100001-631	100001-632	100001-633	100001-634	100001-635	100001-636	100001-637	100001-638	100001-639	100001-640	100001-641	100001-642	100001-643	100001-644	100001-645	100001-646	100001-647	100001-648	100001-649	100001-650	100001-651	100001-652	100001-653	100001-654	100001-655	100001-656	100001-657	100001-658	100001-659	100001-660	100001-661	100001-662	100001-663	100001-664	100001-665	100001-666	100001-667	100001-668	100001-669	100001-670	100001-671	100001-672	100001-673	100001-674	100001-675	100001-676	100001-677	100001-678	100001-679	100001-680	100001-681	100001-682	100001-683	100001-684	100001-685	100001-686	100001-687	100001-688	100001-689	100001-690	100001-691	100001-692	100001-693	100001-694	100001-695	100001-696	100001-697	100001-698	100001-699	100001-700	100001-701	100001-702	100001-703	100001-704	100001-705	100001-706	100001-707	100001-708	100001-709	100001-710	100001-711	100001-712	100001-713	100001-714	100001-715	100001-716	100001-717	100001-718	100001-719	100001-720	100001-721	100001-722	100001-723	100001-724	100001-725	100001-726	100001-727	100001-728	100001-729	100001-730	100001-731	100001-732	100001-733	100001-734	100001-735	100001-736	100001-737	100001-738	100001-739	100001-740	100001-741	100001-742	100001-743	100001-744	100001-745	100001-746	100001-747	100001-748	100001-749	100001-750	100001-751	100001-752	100001-753	100001-754	100001-755	100001-756	100001-757	100001-758	100001-759	100001-760	100001-761	100001-762	100001-763	100001-764	100001-765	100001-766	100001-767	100001-768	100001-769	100001-770	100001-771	100001-772	100001-773	100001-774	100001-775	100001-776	100001-777	100001-778	100001-779	100001-780	100001-781	100001-782	100001-783	100001-784	100001-785	100001-786	100001-787	100001-788	100001-789	100001-790	100001-791	100001-792	100001-793	100001-794	100001-795	100001-796	100001-797	100001-798	100001-799	100001-800	100001-801	100001-802	100001-803	100001-804	100001-805	100001-806	100001-807	100001-808	100001-809	100001-810	100001-811	100001-812	100001-813	100001-814	100001-815	100001-816	100001-

FEODOS'EV, V. I.

Uprugie elementy tochnogo priborostrieniya; Teoriia i raschet. Moskva, Oborongiz, 1949.
342 p. diagrs.

Bibliography: p. 338-(341)

Elastic elements of precision instruments; theory and design.

DLC: QC100.5.F4

SO: Manufacturing and Mechanical Engineering in the Soviet Union, Library of Congress, 1953.

PANOV, D. IU., and V. I. FEODOSIEV.

O ravnovesii i potere ustochivosti pologikh matematika i mekhanika,
1948, v. 12, no. 4, p. 389-406, diagrs., bibliography)

Title tr.: On the equilibrium and instability of sloping shells
with large deflections.

See errata in the same periodical for 1949, v. 13, no. 1, p. 116.

Reviewed by I. S. Sokolnikoff in Mathematical Reviews, 1949,
v. 10, no. 3, p. 218.

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FEODOS'YEV, V. I.

PA 39/49T42

USSR/Engineering

Mechanics

Mathematics - Applied

Jan/Feb '49

"Note on Previous Article by D. Yu. Panov and V. I.
Feodos'yev" l. p

"Priklad Matemat i Mekh" Vol XIII, No 1

Presents a correction by L. I. Balabukh to article,
"Equilibrium and Loss of Stability in Slanting
Shells Under Large Depressions," in "Priklad
Matemat i Mekh" Vol XII, No 4, 1947. Submitted
4 Oct 48.

39/49T42

AMR

Elasticity Theory

Q1080. *Vvedensky, V. I. Selected problems and questions in strength of materials (Zadaniya zadachi i voprosy po soprotivleniyu materialov)*, Moscow-Leningrad, Gostekh-Tekh. Izd., 1960, 214 pp., 277 figs.

This valuable collection of nonconventional exercises is not for beginners but for ambitious advanced students, for experienced stress analysts, and for research workers in applied elasticity. The problems range from such subjects as tension, compression, and bending to stability of equilibrium and of motion, from the state of combined stress and theories of strength to questions concerning analysis of shells. As an example, we mention here problem no. 132 (pp. 83-84, 211) which gives an instructive illustration of Timoshenko, "Plates and shells," 1940, p. 396, known below Eq. 184. (This problem is, by the way, referred to by K. V. Zernova and V. V. Novozhilov in a paper on "Bifurcations deformation of toroidal shells," *Prakt. Mat. Mekh.* 15, 8, 821-830, 1951.) Not less than 75% of the book is devoted to the solutions of problems. It is of considerable educational value for the computing engineer.

J. Malkin, USA

FEDOS'YEV, V.I.

BABRIN, S.I., kandidat tekhnicheskikh nauk; BAKSHIN, R.S., professor, doktor tekhnicheskikh nauk; BEYTEL'MAN, R.P., inzhener; BELYAYEV, V.M., kandidat tekhnicheskikh nauk; BINGEN, I.A., kandidat tekhnicheskikh nauk; BOGUSLAVSKIY, P.Ye., kandidat tekhnicheskikh nauk; BOBOVICH, L.S., kandidat tekhnicheskikh nauk; VOL'KIR, A.S., professor, doktor tekhnicheskikh nauk; GONIKERG, Yu.M., inzhener; GORODETSKIY, I.Ye., professor, doktor tekhnicheskikh nauk; GORDON, V.O., professor; DIMENTBERG, F.M., kandidat tekhnicheskikh nauk; DOSCHATOV, V.V., inzhener, IVANOV, A.G., kandidat tekhnicheskikh nauk; KINASOSHVILI, R.S., professor; KOONER, D.S., kandidat tekhnicheskikh nauk; KULAMITSEV, A.A., kandidat tekhnicheskikh nauk; KRUTIKOV, I.P., kandidat tekhnicheskikh nauk; KUSHUL', N.Ya., kandidat tekhnicheskikh nauk; LEVISON, Ye.M., inzhener; MAZYRKIN, I.V., inzhener; MALIBIN, N.N., kandidat tekhnicheskikh nauk; MARTYNOV, A.P., kandidat tekhnicheskikh nauk; MIBERG, N.Ya., kandidat tekhnicheskikh nauk; NIKOLAEV, G.A., professor, doktor tekhnicheskikh nauk; PETROSEVICH, A.I., doktor tekhnicheskikh nauk; POZDNYAKOV, S.N., dotsent; PONAMOREV, S.D., professor, doktor tekhnicheskikh nauk; PRIGOROVSKIY, N.I., professor, doktor tekhnicheskikh nauk; PRONIN, B.A., kandidat tekhnicheskikh nauk; RESMETOV, D.M., professor, doktor tekhnicheskikh nauk; SATEL', E.A., professor, doktor tekhnicheskikh nauk; SERBENSEN, S.V.; SLOBODKIN, M.S., inzhener; SPITSYN, N.A., professor, doktor tekhnicheskikh nauk; STCIBIN, G.B., kandidat tekhnicheskikh nauk; TAYTS, B.A., kandidat tekhnicheskikh nauk; TETEL'BAUM, I.M., kandidat tekhnicheskikh nauk; UMANSKIY, A.A., professor, doktor tekhnicheskikh nauk; FEDOS'YEV, V.I., professor, doktor tekhnicheskikh nauk;

(Continued on next card)

BABKIN, S.I.--- (continued) Card 2.

KLAVT, D.M., kandidat tekhnicheskikh nauk; BYDINGV, V.Ya., kandidat tekhnicheskikh nauk; SHRAYBER, M.H., inzhener, nauchnyy redaktor; SHEDHOV, V.S., kandidat tekhnicheskikh nauk, nauchnyy redaktor; TSVETKOV, A.P., detsent, nauchnyy redaktor; SLEZNIKOV, G.I., inzhener, nauchnyy redaktor; MARKUS, M.Ye., inzhener, nauchnyy redaktor; KAROANOV, V.G., inzhener, nauchnyy redaktor; ASHERKAS, N.S., doktor tekhnicheskikh nauk, professor, redaktor; SUKOLOVA, T.F., tekhnicheskiy redaktor

[Manual of machinery manufacture] Spravochnik mashinostroitelia;
v trekh tomakh. Moskva, Gos.sauchno-tekhn. izd-vo mashinostroit.
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1. Deystvitel'nyy chlen Akademii nauk USSR (for Serensen)
(Machinery)

FEODOS'YEV, V. I.

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FEODOS'YEV, V.I.

COLLECTED

PHASE I

Treasure Island Bibliographic Report

BOOK

Authors: PONOMAREV, S.D.; BIDERMAN, V.L.; LIKHAREV, K.K.; MAKUSHIN, V.M.;
MALININ, N.N.; FEODOS'YEV, V.I.

Full Title: FUNDAMENTALS OF MODERN METHODS FOR STRENGTH COMPUTATIONS IN MACHINE-BUILDING. (Computations of dynamic loads. Stability. Creep).

Transliterated Title: Osnovy sovremennoykh metodov rascheta na prochnost' v mashinostroyenii. (Raschety pri dinamicheskoy nagruzke, Ustoychivost'. Polzuchest').

Publishing Data

Originating Agency: None.
Publishing House: (MASHGIZ) State Scientific and Technical Publishing House
of Literature on Machine Building.

Date: 1952 No. pp.: 862 No. copies: 10,000

Editorial Staff

Editor: Prof. Ponomarev, D.D.,
Dr. Eng. Sci.

Technical Editor: None.

Editor-in-Chief: None.

Appraiser: None.

Others: Golovin, S. Ya., Eng., editor of literature on heavy machine building.

Text Data

Coverage: The three parts of this book discuss: 1) the strength computation
of various machine elements under dynamic loads, 2) the stability
computation of machine elements, 3) the creep computation of machine
parts working at high temperatures. The first section describes the
computation of the strength of moving machine elements, particularly
1/2

FEODOS'YEV, V.I.

60000003

2/2

Call No.: AF58002

Full Title: FUNDAMENTALS OF MODERN METHODS FOR STRENGTH COMPUTATIONS IN MACHINE-BUILDING. (Computations of dynamic loads. Stability. Creep).

Text Data

Coverage: (continued)

discs and wheels; investigates questions of elastic vibration in connection with various practical problems (harmonic, non-harmonic, quasi-harmonic, non-linear and other types of vibration); and analyzes the strength of elements under variable loads. The second part concerns methods of computing the stability of rods and springs (twisted and compressed-coiled), or rings and flat shapes of curved thin strips, of the elements of thin-wall construction and non-symmetric profiles, of thin rectangular plates, and of rotating casings. The third section analyzes the questions of creep and relaxation of tension, permanent deformation, and aging of parts subjected to the action of high temperatures.

Purpose: A textbook for design engineers in the field of machine building and students of the technical colleges and also for scientific workers.

Facilities: None.

No. Russian and Slavic References: 382 of total 409.

Available: Library of Congress.

FEODOS'YEV, V.I.

PHASE I

TREASURE ISLAND BIBLIOGRAPHICAL REPORT

AID 406 - I

BOOK

Author: FEODOS'YEV, V. I.

Full Title: SELECTED QUESTIONS AND PROBLEMS ON THE STRENGTH OF MATERIALS. Second supplemented and revised edition

Transliterated Title: Izbrannyye zadachi i voprosy po soprotivleniyu materialov

Publishing Data

Originating Agency: None

Publishing House: State Publishing House of Technical and Theoretical Literature

Date: 1953 No. pp.: 238 No. of copies: 20,000

Editorial Staff

Editor: None

Tech. Ed.: None

Editor-in-Chief: None

Appraiser: None

Others: The author expresses thanks for valuable help to Balabukh, L. I., Biderman, V. L., Birger, I. A. and Andreyev, L. Ye.

Text Data

Coverage: This book of selected problems was approved by the Main Administration of Higher Education of the Ministry of Culture of the U.S.S.R. Problems were selected to cover special cases of the strength of materials, which might be met by students not only in school but also in their later activities. Some problems are

1/2

Izbrannyye zadachi i voprosy po
soprotivleniyu materialov

AID 406 - I

simple, some difficult. For the solution of some problems, the application of the theory of elasticity and a knowledge of higher mathematics will be necessary. Diagrams, graphs, etc.

Some problems, especially those dealing with thin plates and shells, are interesting.

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Tension, compression, torsion. Geometrical properties of a section. Bending. Compound stressed condition and the theory of strength. Rigidity. Various problems and questions.	
Solution of Problems and Answers to Questions	56-238
Tension, compression, torsion. Geometrical properties of a section. Bending. Compound stress condition and the theory of strength. Rigidity. Various problems and questions. Bibliography.	

Purpose: Not stated

Facilities: None

No. of Russian and Slavic References: 9 Russian 1935-1952

Available: Library of Congress.

2/2

FEODOS'YEV, V.I.

Dear Comrades! I am writing to you at the request of the Ministry of Education of the USSR, in the name of the Central Committee of the Communist Party of the Soviet Union, the All-Union Council of Trade Unions, the All-Union Scientific Society of Engineers, Architects, Designers, and Technicians, and technicians have been submitted for competition for titles of Priem for
"Engineering" in Moscow, April 1954. (1 Apr 1954)

Ponomarev, S.D.
Viderman, V.L.
Likharev, K.K.
Malinin, N.N.
Makushin, V.M.
Feodos'yev, V.I.

Title of work:
"Elements of Modern Methods
of Calculating Strength in
Machine Building"
Prepared by:
Moscow Higher Technical School
imeni Bauman

3

3160. Fedorov, V. I. On the stability of a spherical shell
under the action of an external uniformly distributed pressure
(in Russian). *Prakt. Mat. Mekh.* 16, 1, 35-42, Jan-Feb 1954.
(English translation by M. D. Friedman is on file with Scientific
Translation Division, Library of Congress.)

This is a further contribution to the intriguing and as yet only
partially understood problem of the elastic stability of a thin
cylindrical shell under external pressure. The analysis is based
upon Galerkin's method. It is shown that there are forms of
equilibrium involving large displacements over a relatively small
region, that can exist for zero external pressure (and even some
degree of internal pressure). This phenomenon is familiar
through the behavior of a rubber ball that is not well inflated.
Although the detailed results are of interest, they appear to have
been foreshadowed to some extent, at least, by Friedrichs [Trans.
from Rend. Accad. Nazionale Lincei, Vol. 30, Parte II, No. 1, 1941, pp.
258-272]. Moreover, in reviewing a paper, it
seems likely that further understanding of the problem will be
obtained only through the elegant approach of de Freitas [ibid.,
pp. 260-261].

H. C. Hays, SN

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FEOKTISTOV, V. I., ed.

N/5
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Nekotorye voprosy mekhanik. Some mechanics problems. Moskva, Oborongiz, 1955.
155 P. diagrs., graphs, tables. (Moscow. Vyssheye Tekhnicheskoye Uchilishche,
32.)
Bibliography throughout.

ANDREYEV, L.Ye., kandidat tekhnicheskikh nauk; BIDERMAN, V.L., kandidat tekhnicheskikh nauk; BOYARSHINOV, S.V., kandidat tekhnicheskikh nauk; VOL'MIR, A.S., doktor tekhnicheskikh nauk; DIMKIEWICZ, F.M. kandidat tekhnicheskikh nauk; ZASELATELEV, S.M., inzhener; KINASOSHVILI, R.S., doktor tekhnicheskikh nauk, professor; KOVALENKO, A.D.; MAKUSHIN, V.M., kandidat tekhnicheskikh nauk MALININ, N.N., kandidat tekhnicheskikh nauk; PONOMAREV, S.D., doktor tekhnicheskikh nauk; PRIGOROVSKIY, N.I., doktor tekhnicheskikh nauk; TETEL'BAUM, I.M., kandidat tekhnicheskikh nauk; UMANSKIY, A.A., doktor tekhnicheskikh nauk, professor; ~~FIODOS'YEV~~, V.I., doktor tekhnicheskikh nauk; SERENSHI, S.V., redaktor; TRAPEZIN, I.I., kandidat tekhnicheskikh nauk, redaktor; KARGANOV, V.G., inzhener, redaktor; SOKOLOVA, T.F., tekhnicheskiy redaktor.

[Mechanical engineer's manual; in 6 volumes] Spravochnik mashino-stroitelia; v shesti tomakh. Izd.2-e, ispr. i dop. Moakva, Gos. nauchno-tekhn. izd-vo mashinostroit. lit-ry, Vol.3, 1955. 563 p.
(Mechanical engineering) (MLRA 8:12)

FEODOS'YEV, VSEVOLOD IVANOVICH.

Vvedeniye v Rakethuyu Tekhniku (By) V.I. Feodos'yev, G.B. Sinyarev.

Moskva, Oborongiz, 1956.

375 P. Illus., Diagrs., Graphs, Ports, Tables.

Bibliography: P. 370

Издательство
PONOMAREV, S.D., doktor tekhnicheskikh nauk, professor; BIDERMAN, V.L.;
LIKHAREV, K.K.; MAKUSHIN, V.M.; MALININ, N.N.; YERODOS'YEV, V.I.;
POPOVA, S.M., tekhnicheskiy redaktor; MATVEYEVA, Ye.N., tekhnicheskiy redaktor

[Calculations of the strength of materials in machine manufacture]
Raschety na prochnost' v mashinostroenii. Pod red. S.D.Ponomareva.
Moskva, Gos. nauchno-tekhn. izd-vo mashinostroit. lit-ry. Vol. 1.
[Theoretical principles and experimental methods. Calculations for
structural rod elements under static load] Teoreticheskie osnovy i
eksperimental'nye metody. Raschety sterzhnevyykh elementov konstruk-
tsii pri staticheskoi nagruzke. 1956. 884 p. (MLRA 10:3)
(Strength of materials) (Elasticity)

24(6)

PHASE I BOOK EXPLOITATION

SOV/2397

Ponomarev, S.D., V.L. Biderman, K.K. Likharev, V.M. Makushin,
N.N. Malinin, and V.L. Feodos'yev

Raschety na prochnost' v mashinostroyenii. t. II: Nekotoryye zadachi
prikladnoy teorii uprugosti. Raschety za predelami uprugosti.
Raschety na polzuchest' (Design for Strength in Machinery Construction. Vol 2:
Some Problems in the Applied Theory of Elasticity. Calculation
Beyond Elastic Limits. Design for Creep) Moscow, Mashgiz, 1958.
974 p. Errata slip inserted. 15,000 copies printed.

Ed.: S.D. Ponomarev, Doctor of Technical Sciences, Professor; Ed.
of Publishing House: N.P. Chernysheva; Tech. Ed.: B.N. Model';
Managing Ed. for Literature of Heavy Machine Building (Mashgiz):
S.Ya. Golovin, Engineer.

PURPOSE: The book is intended for engineers, designers, and process
engineers in the field of machinery design and construction. It
may also be useful to students, aspirants, and scientific workers.

Card 1/17

Design for Strength in Machinery Construction (Cont.)

SOV/2397

COVERAGE: This book deals with some problems of the applied theory of elasticity and the calculation of plastic deformation and creep. Design methods for circular and rectangular plates, shells of rotation, and thick-walled tubes are presented. The theory of contact stresses, the design of structural elements made of rubber and rubberized cord, calculations of elastoplastic strains, and calculations of steady and unsteady states of creep are discussed. No personalities are mentioned. References follow each chapter.

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Technical Applications

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FEODOS'YEV, VSEOLOD IVANOVICH

Introduction to Rocket Technology, By V.I. Feodosiev and G.B. Sinyarev.

New York, London, Academic Press, 1959.

344 P. Illus., Charts, Diagrs., Tables.

Bibliography: P. 340

Translated from the original Russian: Vvedeniye V Raketnuyu Tekhniku.

FEODOS'YEV, V.I.

PHASE I BOOK EXPLOITATION

SOV/3423

Ponomarev, Sergey Dmitriyevich, Honored Worker in Science and Technology,
Professor, Doctor of Technical Sciences, Vladimir Mikhaylovich Makushin,
Nikolay Nikolayevich Malinin, and Vsevolod Ivanovich Feodos'yev

Raschety na prochnost' v mashinostrcenyemii, tom 3: Inertsionnyye nagruzki.
Kolebaniya i udarnyye nagruzki. Vynoslivost'. Ustoychivost' (Design
for Strength in Machinery Construction, Vol 3: Inertial Loads. Vibrations
and Impact Loads. Endurance. Stability) Moscow, Mashgiz, 1959. 1118 p.
Errata slip inserted. 12,000 copies printed.

Ed. of Publishing House: N. P. Chernysheva; Tech. Ed.: B. I. Model';
Managing Ed. for Literature on Heavy Machine Building: S. Ya. Golovin,
Engineer; Ed.: Sergey Dmitriyevich Ponomarev, Honored Worker in Science
and Technology, Professor, Doctor of Technical Sciences.

PURPOSE: The book is intended for design and production engineers in machine-building enterprises. It will be of interest to students of engineering design.

Card 1/15

Strength Calculations in Mechanical Engineering (Cont.) SOV/3423

COVERAGE: The book covers methods of calculation for stability, stress, creep, fatigue, etc. Particular attention is paid to strength calculations of moving machine parts, such as turbine buckets and discs, with reference to stress and creep data. Other problems treated include: analysis of various types of vibrations; calculations for dynamic load varying with time; stress concentration and fatigue failures; stress distribution in bars, plates, shells, etc.; stress coefficients for rotating discs; and behavior of material under conditions of stress. F. D. Ponomarev reviewed the entire book and wrote Chapter I and section 5 of Chapter III. Chapter II and the remainder of Chapter III were written by N. N. Malinin. Chapter IV - X were written by V. L. Biderman. Chapter XI was compiled by K. K. Likharev and N. N. Malinin. Chapters XIII - XVI were written by V. M. Makushin, Chapter XVII - by V. I. Feodos'yev, and the Appendix by K. K. Likharev. There are 857 references: 712 Soviet, 90 English, 54 German, and 1 French.

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AVAILABLE: Library of Congress
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FEODOS'YEV, Vsevolod Ivanovich; TRAPEZIN, I.I., red.; GAVRILOV, S.S.,
tekhn.red.

[Strength of materials] Soprotivlenie materialov. Moskva, Gos.
izd-vo fiziko-matem.lit-ry, 1960. 536 p.

(MIRA 14:1)

(Strength of materials)

PHASE I BOOK EXPLOITATION SOV/4694

Feodos'yev, Vsevolod Ivanovich, and Gennadiy Borisovich Sinyarev

Vvedeniye v raketnuyu tekhniku (Introduction to Rocket Engineering) 2d ed., rev.
and enl. Moscow, Oborongiz, 1960. 507 p. Errata slip inserted. 25,000
copies printed.

Managing Ed.: S. D. Krasil'nikov, Engineer; Ed. of Publishing House: N. A.
Gortsevaya; Tech. Ed.: V. P. Roshin.

PURPOSE: This book is intended for students at schools of higher technical
education.

COVERAGE: The book based chiefly on data published in non-Soviet sources, deals
with general rocket engineering. It is directed to persons already acquainted
with general physics, general chemistry, and the principles of higher mathe-
matics and theoretical mechanics, but who have not yet studied thermo-
dynamics or aerodynamics. The following topics are discussed: the construc-
tional and operational principles of modern rockets and rocket engines, the
fundamentals of propellant combustion and gas outflow, simple problems in

Card 1/14

Introduction to Rocket (Cont.)

sov/4694

ballistics and aerodynamics, the general principles of stabilizing and steering rockets in flight, and testing and launching devices for rockets and rocket engines. Chapters III, IV, V and most of Ch. VI were written by G. B. Sinyarev; the remainder was written by V. I. Fedos'yev. No personalities are mentioned. There are 20 references, all Soviet (6 are translations into Russian).

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FEODOS'YEV, Vsevolod Ivanovich

Vvedeniye v raketnuyu tekhniku [by] V. i. Feodos'yev [17]. SINYAREV, G. B.

Izd 2., ispr. i dop. Moskva, Oborongiz, 1961.

506 p. illus., diagrams, graphs, ports, tables.

Bibliography: p. 501

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10.6000
26.2142
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21345
S/040/61/025/006/012/021
D299/D304

AUTHORS: Gabril'yants, A.G., and Feodos'yev, V.I. (Moscow)

TITLE: On the axisymmetric equilibrium of elastic spherical shells under the action of evenly-distributed pressure

PERIODICAL: Prikladnaya matematika i mekhanika, v. 25, no. 6,
1961, 1091 - 1101

TEXT: The problem under consideration is one of those elasticity-problems, for which the idealization of actual systems leads to considerable error. It is assumed that the actual shell differs slightly from the ideal shell, namely in the shape of the middle plane, denoted (for simplicity) by a single parameter f . The shell undergoes, as a result of the external pressure p , the local buckling w . The character of the curve $p = p(w)$ is determined by f (see Fig. 2). The solution of the problem involves determination of the so-called minimum buckling load p_{\min}^0 which delimits the possible

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D299/D304

On the axisymmetric equilibrium ...

effect of snapping. Thereby, the loss of stability is assumed as probable in the interval $p_{\min}^0 < p^0 < p_*^0$. Thus, it is necessary to determine the equilibrium form of spherical shells in the region of large displacements. The authors review earlier attempts to solve the problem and conclude that variational methods could no longer yield useful results. Below, the numerical solution (obtained by means of computers) is given of the nonlinear equations of a half-sphere. The solution is independent of the parameter R/h (radius to thickness); it is exact within the limits of applicability of the equations for sloping shells. The equations for sloping shells are, assuming an axisymmetric form of equilibrium, (and after transformation and linearization):

$$z \frac{d\Psi}{dx} + \frac{d\Psi}{ds} - \frac{\Psi}{s} = \Theta x \quad (2.8)$$

$$z \frac{d\Theta}{dx} + \frac{d\Theta}{ds} - \frac{\Theta}{s} = -\Psi z - p_0 x \Theta \quad (2.9)$$

where x represents the dimensionless radius, Θ - the angle of rotation of the meridian arc, and Ψ is a measure of the difference between the radial stress T_1 and its value $1/2 pR$, corresponding to Card 2/5

21345

S/040/61/025/006/012/021
D299/D304

On the axisymmetric equilibrium ...

the membrane state. The linearization applies to the interval $x > x_k$.
The solution in the linear interval, is obtained in terms of Hankel functions of a complex argument. These functions are not tabulated and a method for computating them is proposed which involves asymptotic expansion. Further, the non-linear interval $0 \leq x \leq x_k$ is considered. Introducing the notations

$$\frac{d\theta}{dx} = u, \quad \frac{d\Psi}{dx} = v, \quad (4.1)$$

the original system of equations is rewritten in finite differences:

$$\begin{aligned}\Delta v &= [\theta + \frac{\theta^1}{2x} - \frac{v}{x} + \frac{\Psi}{x^2}] \Delta x \\ \Delta u &= [-\Psi - \frac{v\theta}{x} - p_0\theta - \frac{u}{x} + \frac{\theta}{x^2}] \Delta x \\ \Delta\theta &= u\Delta x, \quad \Delta\Psi = v\Delta x\end{aligned} \quad (4.2)$$

From the conditions of continuity one obtains.

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$$K_1 \theta_k + K_2 \psi_k - u_k = 0, \quad -K_2 \theta_k + K_3 \psi_k - v_k = 0 \quad (4.5)$$

where K_1 , K_2 , K_3 are given by expressions. The order of the computations was as follows: p_0 was assumed ≤ 2 , $x_k = 10$; thereupon K_1 , K_2 , K_3 were calculated and equations (4.2) were numerically integrated; the values of u_k , v_k , θ_k and ψ_k , obtained by integration, were substituted in Eq. (4.5). The integration was carried out by means of a digital computer. The obtained results are summarized in a figure. The minimum buckling load was found to be $p_0^{\min} = 0.06$, whereby the relative buckling $w/h = 22-23$. There are 9 figures and 8 references: 4 Soviet-bloc and 4 non-Soviet-bloc. The references to the English-language publications read as follows: T. von Karman, and H.S. Tsien, The Buckling of Spherical Shells by External Pressure, Journal of the Aeronautical Sciences, 1939, Dec. v. 7, no. 2, 43-50; K.O. Friedrichs, On the Minimum Buckling Load for Spherical Shells, von Karman Anniversary Volume, pp. 258-272. California Institute of Technology, Pasadena, 1941; H.B. Keller and E.L. Reiss,

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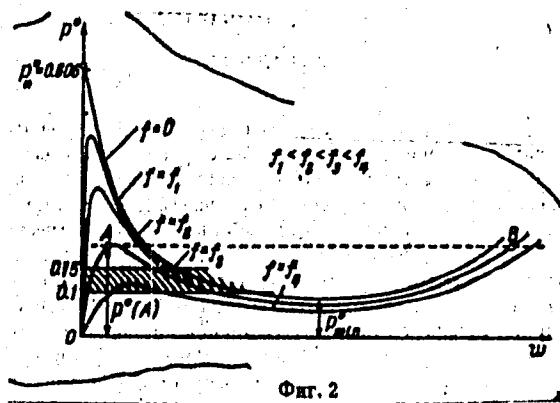
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Fig. 2.



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A method for solving nonlinear problems of the stability of
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ACCESSION NR: AP4015969

S/0040/63/027/005/0833/0841

AUTHOR: Feodos'yev, V. I. (Moscow)

TITLE: Use of a step method for analyzing stability of a compressed rod

SOURCE: Prikl. matem. i mekhan., v. 27, no. 5, 1963, 833-841

TOPIC TAGS: step method, stability, compressed rod, deformed system, Galerkin method, nonlinear equation

ABSTRACT: The author proposes a method for analyzing deformed systems based on consideration of deformation as a process. Time is considered as a parameter determining the development of deformations. Integration in time is done on a high-speed digital computer. The boundary part of the problem is solved by Galerkin's method. With this approach it is not necessary to solve nonlinear equations. In them one substitutes the values of the parameters of the preceding step. This makes it possible to increase slowly the number of variable parameters and makes the solving of nonlinear problems no more complicated than linear ones. As an example, the author investigates the problem of stability of a rod at the limits of elasticity. Orig. art. has: 8 figures and 21 formulas.

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FEODOS'YEV, V. I. (Moscow)

"On the stability of deformable systems".

report presented at the 2nd All-Union Congress on Theoretical and Applied Mechanics Moscow, 29 January - 5 February 1964.

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